

Hæmulon fremebundum.

Hæmulon fremebundum Goode & Bean has been redescribed under the name of *Diabasis lateralis* by Vaillant & Bocourt, Mission Scientifique au Mexique iv, 180, 1883, from Jamaica.

Sciæna ensifera.

Corvina fulgens Vaillant & Bocourt, l. c., 164, is the prior-named (1882) *Sciæna ensifera* of Jordan & Gilbert.

Enneacentrus fulvus ruber.

The scarlet variety of *Enneacentrus fulvus* should stand as *Enneacentrus fulvus ruber*, instead of *ouatalibi*, as inadvertently given by us on page 402.

Notropis lirus.

Notropis alabamæ, described by Jordan & Meek on page 476, proves to be inseparable from *Notropis lirus*.

Pæcilichthys jessiaë.

Pæcilichthys swaini (page 479) is based on an individual indistinguishable from *P. jessiaë* except that the lateral line is complete. A larger series of specimens shows that this "generic" character has here not even specific value. *Pæcilichthys asprigenis* Forbes seems also to vary into *P. jessiaë*.

Boleosoma maculatum.

Pæcilichthys beani Jordan (l. c., 479) is based on a somewhat mutilated individual of *Boleosoma maculatum*.

The poor condition of the specimen misled me as to its generic relations.

INDIANA UNIVERSITY, December 6, 1884.

DESCRIPTION OF A NEW SPECIES OF HYBOGNATHUS (HYBOGNATHUS HAYI) FROM MISSISSIPPI.

By DAVID S. JORDAN.

In the Bulletin of the United States Fish Commission, 1882, p. 67, Prof. O. P. Hay has correctly distinguished two species of *Hybognathus* from specimens collected by him in streams of Mississippi and Western Tennessee. For these species he has adopted the names of *Hybognathus nuchalis* Agassiz and *H. argyritis* Girard. There is no doubt that the *H. nuchalis* is correctly identified. The specimens called *argyritis* by Professor Hay, belong, however, to a species different from the original types of *argyritis* Girard, with which I have compared them. I regard them as a distinct species, for which I propose the name of *Hybognathus hayi*.

Head $4\frac{2}{5}$ in length ($5\frac{2}{5}$ with caudal); depth $4\frac{3}{7}$ ($4\frac{4}{5}$). D. 8; A. 8. Scales 5-36-3.

Body comparatively elongate, the caudal peduncle rather longer and slenderer than in *H. nuchalis*, and the back somewhat more elevated at base of dorsal. From the insertion of the first ray of dorsal the profile is more rapidly declined both anteriorly and posteriorly than in *H. nuchalis*.

Head small and rather low, evenly rounded above. Snout short, rather less obtuse than in *H. nuchalis*, $4\frac{1}{3}$ in head. Eye large, larger than in *nuchalis*, longer than snout, $3\frac{2}{3}$ in head. Premaxillaries in front higher than in *nuchalis*, on the level of the lower part of pupil. Maxillary a trifle longer than in *H. nuchalis*, not quite reaching to eye, its length about $5\frac{1}{2}$ in head. Mouth rather more oblique than in *H. nuchalis*, the lower jaw scarcely shorter than the upper when the mouth is closed. Lower jaw rounded, slightly less obtuse than in *H. nuchalis*. Suborbital bones very narrow, much narrower than in *H. nuchalis* or *H. argyritis* (somewhat variable in all three species), the anterior suborbital about three times as long as deep. In *H. nuchalis* it is usually not twice as long as deep. Scales, lateral line, and fins essentially as in *H. nuchalis*, the dorsal rather higher, its anterior rays as long as head.

Color, bluish above, silvery below, a silvery lateral shade. Fins pale.

Alimentary canal (according to Hay) shorter than in *H. nuchalis*; $4\frac{1}{2}$ to $7\frac{1}{2}$ times length of body.

Length of largest specimen, about 4 inches.

Specimens of this species have been sent to the National Museum by Professor Hay, from Memphis, Tenn., and from Vicksburg, Edwards, Jackson, Vaughans, and Grenada, Miss. No. 32306, from the Pearl River, at Jackson, may be regarded as the special types of the species.

Of *Hybognathus nuchalis*, I have examined many specimens from the Delaware River, and from various streams in Indiana, Illinois, Kentucky, Tennessee, Alabama, Mississippi, Iowa, Kansas, Wyoming, Missouri, Arkansas, and Texas. The only variations I notice in these may be thus summarized: Certain Iowa specimens (Des Moines R.; Hundred and Two River) are dusky in color, instead of the usual bluish-silvery shades. Some Alabama specimens have the eye larger, almost as large as in *H. hayi*. In other specimens, from Kansas, from the Missouri River (Saint Joseph), and from the Arkansas River (these the types of *Hybognathus placitus* Girard), the eye is smaller (4 to $4\frac{1}{2}$ in head) and there are some slight differences in proportions, the caudal peduncle being less slender, &c. These possibly represent a distinct subspecies, or even species (*placita*), but I think that a full series will show complete intergradation with *H. nuchalis*. The suborbitals are alike in both, as also in all the real and supposed species of *Hybognathus*, excepting *H. hayi*. Specimens from the Potomac are larger in size (6 inches or more) than any others I have ever seen. These are also less elongate than the Western specimens, and the eye is proportionately larger ($3\frac{2}{3}$ in head). Otherwise I can detect no difference. These specimens represent the *Hybognathus regius* of Girard, which for the present we may regard as a distinct sub-

species (*Hybognathus nuchalis regia*). The *Hybognathus osmerinus* Cope, from the Delaware River, I cannot distinguish from the ordinary *nuchalis*.

The types of *Hybognathus argyritis* Girard from the Upper Missouri River seem to represent a species distinct from *H. nuchalis*. The mouth is larger, larger even than in *H. hayi*, its cleft extending nearly to the eye; the jaws are subequal, the lower angular at tip; the suborbitals are broad as in *H. hayi*. In other respects it agrees essentially with *H. nuchalis*.

The types of *Hybognathus eransi* Girard are not preserved, but from the description I infer that it is identical with *H. nuchalis*.

The small species of the Texan region, to which Girard has given the names of *Dionda* and *Algoma* may, perhaps, be regarded as generically distinct from *Hybognathus*, the pharyngeal teeth being somewhat different in form.

Of these species the following appear to be valid:

*Dionda nubila** Forbes.

*Dionda episcopa** Girard = *Dionda texensis** Girard = (?) *Dionda papalis* Girard = *Dionda argentosa** Girard = (?) *Dionda chrysitis* Girard = *Hybognathus flavipinnis* Cope.

*Dionda serena** Girard = *Hybognathus nigrotæniatus* Cope.

Dionda punctifera Garman.

Dionda melanops Girard = *Dionda couchi** Girard.

Dionda fluviatilis Girard.

*Dionda amara** Girard.

INDIANA UNIVERSITY,
December 16, 1884.

ON THE OCCURRENCE OF *Loncheres armatus*, (GEOFF.) WAGNER, IN THE ISLAND OF MARTINIQUE, WEST INDIES.

By FREDERICK W. TRUE.

Curator of the Department of Mammals.

Among the specimens of West Indian animals received from Mr. F. A. Ober in 1878, was a skin (13039) of a large spiny-rat belonging to the genus *Loncheres*. After a careful comparison with the descriptions of Waterhouse and Burmeister, I am inclined to believe that the specimen should be classed with *L. armatus*, (Geoff.) Wagner.

The color of the upper surface of the animal is a mixture of pale Naples yellow, black (or deep brown), and rufous. The rufous color becomes strong on the rump and head, and affects the general coloration least on the shoulders and upper surfaces of the fore limbs. A hair taken from the middle line of the back near the rump exhibits the following colors: Lower two thirds gray, light at the base, and grow-

Of those nominal species marked with the asterisk () the types are now in the National Museum.